

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/625,904	07/24/2003	Ritsuko Kawasaki	0756-7181	. 1203
21780 7590 02/23/2007 ERIC ROBINSON PMB 955 21010 SOUTHBANK ST. POTOMAC FALLS, VA 20165			EXAMINER* SEFER, AHMED N	
			1010MHC11	1555, 111 20105
CHORTENED STATISTOS	AN DEBIOD OF DECRONGS	MAH DATE	DEL IVEN	V MODE
SHORTENED STATUTORY PERIOD OF RESPONSE		MAIL DATE	DELIVERY MODE	
3 MONTHS		02/23/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Paper No(s)/Mail Date _____.

U.S. Patent and Trademark Office

PTOL-326 (Rev. 08-06)

Information Disclosure Statement(s) (PTO/SB/08)

5) Notice of Informal Patent Application

6) Other: _____.

DETAILED ACTION

Priority

1. Submission of the translation of the foreign language application (JP 11-231281) is acknowledged. Therefore, US PG-Pub 2003/0092213 is not available as a prior art.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 3. Claims 1, 3 and 15 are rejected under 35 U.S.C. 102(b) as being anticipated by Nakajima ("Nakajima") USPN 5,763,904.

Nakajima discloses in figs. 24-31 a semiconductor device comprising: a light-transmitting substrate 11; a base film 21 having a projection 24, the film being formed over one surface of the light-transmitting substrate; and an island-like semiconductor layer 12 having a crystal structure covering the projection and extending over a pair of edges of the projection, a gate insulating film 13 over the island-like semiconductor layer; and a gate electrode 14 over the gate insulating film.

Re claim 3, Nakajima discloses (col. 20, line 38-40 and claim 12) the height of the projection being within the recited range.

Re claim 15, Nakajima discloses (col. 21, lines 65-67) a silicon oxide base film.

Art Unit: 2826

4. Claims 2, 4 and 16 are rejected under 35 U.S.C. 102(b) as being anticipated by Nakajima.

Nakajima discloses in figs. 24-31 a semiconductor device comprising: a light-transmitting substrate 1; a base film 21 having a projection 24, the film being formed over one surface of the light-transmitting substrate; a thin film transistor comprising an island-like semiconductor layer 12 comprising a channel formation region 12c, wherein at least a part of the channel formation region being provided over the projection and wherein the island-like semiconductor layer covers the projection and extends over a pair of edges of the projection; and a gate insulating film 13 over an island-like layer; and a gate electrode 14 over the gate insulating film.

Re claim 4, Nakajima discloses (col. 20, line 38-40 and claim 12) the height of the projection being within the recited range.

Re claim 16, Nakajima discloses (col. 21, lines 65-67) a silicon oxide base film.

Claim Rejections - 35 USC § 103

- 5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 6. Claims 19 and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Chen.

Nakajima discloses the device structure as recited in the claim, but does not specifically disclose a semiconductor device being applied to an electronic instrument listed in the claim.

Art Unit: 2826

However, Examiner takes Official Notice that an electronic instrument selected from the group consisting of a personal computer, a video camera or a digital camera is conventional and well known. Therefore, it would have been obvious to one skilled in the art at the time the invention was made to have used any of the various electronic instruments since Examiner takes Official Notice that due to their low power consumption, displays have become a necessary and indispensable structural element of an electronic instrument.

Allowable Subject Matter

7. Claims 11-14, 17, 18, 21 and 22 are allowed.

Response to Arguments

8. Applicant's arguments with respect to claims 1-4, 15, 16, 19 and 20 have been considered but are most in view of the new ground(s) of rejection.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to A. Sefer whose telephone number is (571) 272-1921.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Sue Purvis can be reached on (571) 272-1236.

Art Unit: 2826

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

ANS February 14, 2007

> A. Sefer Patent Examiner Art Unit 2826